

## EAST Search History

Ref #	Hits	Search Query	DBs	Default Operator	Plurals	Time Stamp
S1	65	(438/212).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/02/21 14:21
S2	65	((("438/212").CCLS.) and @ad<="20011004"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/02/11 13:21
S3	3	("5216275").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/02/08 09:29
S4	9891	"438"/\$.ccls. and 'trench'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/02/08 11:03
S5	228088	"257"/\$.ccls. or "438"/\$.ccls. and @ad<="20011004"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/02/08 15:36
S6	1	("257"/\$.ccls. or "438"/\$.ccls. and @ad<="20011004") and 'terraced trench'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/02/08 11:09
S7	9	((("5072266") or ("5541425") or ("5866931"))).PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/02/08 12:36
S8	228088	"257"/\$.ccls. or "438"/\$.ccls. and @ad<="20011004"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/02/08 15:41
S9	1	("257"/\$.ccls. or "438"/\$.ccls. and @ad<="20011004" ) and 'high voltage vertical MOSFET'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/02/08 15:44
S10	5	("257"/\$.ccls. or "438"/\$.ccls. and @ad<="20011004" ) and 'high voltage vertical channel'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/02/08 15:47

## EAST Search History

S11	1475	((438/270) or (257/493)).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/02/11 13:10
S12	65	((("438/212").CCLS.) and @ad<="20011004"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/02/11 14:28
S13	411	((438/211) or (438/268)).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/02/11 14:28
S14	1137	((257/330-332) or (257/329)).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/02/21 12:45
S15	459	(257/328).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/02/21 12:21
S16	1137	((257/330-332) or (257/329)).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2006/03/09 08:22
S17	3	("4893160").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/02/21 13:17
S18	1952	((438/259) or (438/270-271) or (438/212) or (438/589)).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/02/21 13:43
S19	3	("5637898").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/02/21 13:45

## EAST Search History

S20	4	'voltage sustaining layer'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/09 08:18
S21	593	'semiconductor power device'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/07/23 15:51
S22	23	'p doping' with 'bottom'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/07/23 15:41
S23	22	@ad<="20011004" and 'p doping' with 'bottom'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/07/23 16:18
S24	2	("6194741").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/07/23 15:46
S25	1	"4116720".PN.	USPAT	OR	OFF	2002/07/23 15:47
S26	1	"5378914".PN.	USPAT	OR	OFF	2002/07/23 15:47
S27	1	"5378914".PN.	USPAT	OR	OFF	2002/07/23 15:48
S28	1	"5770878".PN.	USPAT	OR	OFF	2002/07/23 15:48
S29	1	"5831288".PN.	USPAT	OR	OFF	2002/07/23 15:48
S30	1	"5915180".PN.	USPAT	OR	OFF	2002/07/23 15:49
S31	1	"6020600".PN.	USPAT	OR	OFF	2002/07/23 15:49
S32	566	@ad<="20011004" and 'semiconductor power device'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 12:38
S33	2943	((438/212) or (438/270) or (438/493) or (438/211) or (438/259) or (438/271) or (438/589) or (438/284) or (438/286) or (438/105) or (438/931)).CCLS.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/07/23 16:21
S34	2852	((((438/212) or (438/270) or (438/493) or (438/211) or (438/259) or (438/271) or (438/589) or (438/284) or (438/286) or (438/105) or (438/931)).CCLS.) and @ad<="20011004"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/07/23 16:22

## EAST Search History

S35	1	((((438/212) or (438/270) or (438/493) or (438/211) or (438/259) or (438/271) or (438/589) or (438/284) or (438/286) or (438/105) or (438/931)).CCLS.) and @ad<="20011004") and 'p type doping' with 'bottom'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/07/23 16:25
S36	6	((((438/212) or (438/270) or (438/493) or (438/211) or (438/259) or (438/271) or (438/589) or (438/284) or (438/286) or (438/105) or (438/931)).CCLS.) and @ad<="20011004") and 'bottom' near 'doping'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/07/23 16:25
S37	0	@d<="20011004" and 'UMOSFET'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2002/07/23 16:45
S38	108	UMOSFET	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 12:44
S39	3	('4754310').PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2002/07/24 09:01
S40	271	@ad<="20011004" and 'power device' and 'sustaining'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 14:19
S41	397	@ad<="20011004" and (438/268).ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 13:39
S42	438	@ad<="20011004" and (438/296).ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 13:40
S43	242	@ad<="20011004" and (438/298).ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 13:40
S44	208	@ad<="20011004" and (438/433-434).ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 13:40

## EAST Search History

S45	525	@ad<="20011004" and (257/328). ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 13:41
S46	420	@ad<="20011004" and (257/329). ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 13:41
S47	680	@ad<="20011004" and (257/330). ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 13:42
S48	152	@ad<="20011004" and (257/334). ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 13:42
S49	437	@ad<="20011004" and 'power device' and 'drift region'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 15:02
S50	0	North-carolina-state.as.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 15:03
S51	57	North adj1 Carolina adj1 State.as. and 'power device'	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2003/03/11 15:05
S52	4	((("5953621") or ("6097076")).PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2003/06/13 09:55
S53	2	("6380569").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2003/06/13 09:56
S54	2	"20040097028"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/08 15:56

## EAST Search History

S55	2	("6465304").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2006/03/08 15:57
S56	2	("6649477").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2006/03/08 15:57
S58	0	@ad<="20011004" and blanchard-richard.in. and "power semiconductor"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/08 16:36
S59	28	@ad<="20011004" and blanchard with richard and "power semiconductor"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/08 16:23
S60	131	@ad<="20011004" and "blanchard" and "power semiconductor"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/08 16:23
S61	51	"blanchard richard" and "power semiconductor"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/08 16:24
S62	1	"20020135014".PN.	US-PGPUB	OR	ON	2006/03/08 16:27
S63	1	"20020132405".PN.	US-PGPUB	OR	ON	2006/03/08 16:27
S64	1	"20020123195".PN.	US-PGPUB	OR	ON	2006/03/08 16:27
S65	1	"20020008258".PN.	US-PGPUB	OR	ON	2006/03/08 16:28
S66	1	"20010053568".PN.	US-PGPUB	OR	ON	2006/03/08 16:28
S67	1	"20010046739".PN.	US-PGPUB	OR	ON	2006/03/08 16:28
S68	3	@ad<="20011004" and epitaxial same (Terrac\$2 with Trench)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/08 16:37
S69	42	@ad<="20011004" and Terrac\$2 with Trench	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/08 16:47

## EAST Search History

S70	2	("6380569").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2006/03/08 16:47
S71	1	"4140558".PN.	USPAT; USOCR	OR	ON	2006/03/08 16:57
S72	1	"4419150".PN.	USPAT; USOCR	OR	ON	2006/03/08 16:58
S73	1	"4569701".PN.	USPAT; USOCR	OR	ON	2006/03/08 16:58
S74	1	"4711017".PN.	USPAT; USOCR	OR	ON	2006/03/08 16:59
S75	1	"4893160".PN.	USPAT; USOCR	OR	ON	2006/03/08 17:00
S76	1	"4914058".PN.	USPAT; USOCR	OR	ON	2006/03/08 17:00
S77	1	"5108783".PN.	USPAT; USOCR	OR	ON	2006/03/08 17:01
S78	1	"5216275".PN.	USPAT; USOCR	OR	ON	2006/03/08 17:02
S79	1	"6376878".PN.	USPAT; USOCR	OR	ON	2006/03/08 17:02
S80	1	"6475864".PN.	USPAT; USOCR	OR	ON	2006/03/08 17:02
S81	1	"6576516".PN.	USPAT; USOCR	OR	ON	2006/03/08 17:03
S82	1	"20010026977".PN.	US-PGPUB	OR	ON	2006/03/08 17:03
S83	1	"20010041400".PN.	US-PGPUB	OR	ON	2006/03/08 17:03
S84	1	"20010036704".PN.	US-PGPUB	OR	ON	2006/03/08 17:04
S85	1	"20010046739".PN.	US-PGPUB	OR	ON	2006/03/08 17:05
S86	1	"20010053568".PN.	US-PGPUB	OR	ON	2006/03/08 17:05
S87	1	"20020008258".PN.	US-PGPUB	OR	ON	2006/03/08 17:06
S88	1	"20020123195".PN.	US-PGPUB	OR	ON	2006/03/08 17:06
S89	1	"20020132405".PN.	US-PGPUB	OR	ON	2006/03/08 17:07
S90	1	"20020135014".PN.	US-PGPUB	OR	ON	2006/03/08 17:07
S91	436	@ad<="20011004" and power with MOSFET and voltage with sustain\$3	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/10/13 11:24
S92	436	@ad<="20011004" and power with MOSFET and (voltage with sustain\$3)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/09 08:20

## EAST Search History

S93	259	@ad<="20011004" and "power MOSFET" and (voltage with sustain\$3)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/09 08:20
S94	29	@ad<="20011004" and "power MOSFET" same (voltage with sustain\$3)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/09 08:29
S95	1140	@ad<="20011004" and (257/330-332).ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/10/13 09:36
S96	539	@ad<="20011004" and (257/339).ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/09 08:23
S97	190	@ad<="20011004" and (257/333).ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/09 08:23
S98	948	@ad<="20011004" and (257/328-329).ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/09 08:25
S99	2	("5,216,275").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2006/03/09 08:26
S10 1	98	@ad<="20011004" and "power MOSFET" same voltage with (sustain\$3 or drift)	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/03/09 08:30
S10 2	2	("6649459").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2006/10/13 09:34
S10 3	6	("5021355"   "5216275"   "5384152"   "5438215").PN. OR ("6649459").URPN.	US-PGPUB; USPAT; USOCR	OR	ON	2006/10/13 09:34
S10 4	768	@ad<="20011004" and (257/330).ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/10/13 09:41



## EAST Search History

S10 5	2	("6649477").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2006/10/13 09:39
S10 6	430	@ad<="20011004" and (257/327). ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/10/13 09:41
S10 7	587	@ad<="20011004" and (257/328). ccls.	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/10/13 09:53
S10 8	2	("6593619").PN.	US-PGPUB; USPAT; USOCR; EPO; JPO; DERWENT; IBM_TDB	OR	OFF	2006/10/13 09:53
S11 1	10	@ad<="20011004" and "power transistor" and "voltage sustaining"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/10/13 11:26
S11 2	102	@ad<="20011004" and power with ("FET" or "MOS" or transistor) and "voltage sustaining"	US-PGPUB; USPAT; EPO; JPO; DERWENT; IBM_TDB	OR	ON	2006/10/13 11:26